

Amendments to the Claims:

The following listing of claims replaces all prior listings and versions of claims in this application.

1. (Currently Amended) A polypeptide comprising a single-domain of the variable region of the heavy chain of an antibody molecule, which is soluble and stable and capable of binding a specific antigen of interest, said polypeptide comprising a natural framework scaffold of a mammalian monoclonal antibody without induced mutations or modifications in the original VH/VL interface framework residues, said VH/VL interface comprising a ~~charged~~ lysine residue at position 44, a Leu residue at position 45, and a Trp residue at position 47, the lysine residue at position 44 providing increased stability to the polypeptide.

2. (Original) The polypeptide of claim 1 wherein the polypeptide is substantially monomeric.

3. (Previously Presented) The polypeptide of claim 1, wherein the polypeptide is encoded by a polynucleotide isolated from a phage clone selected from a phage-display library comprising recombinant phages expressing a single-domain of the variable region of the heavy chain of an antibody molecule comprising a natural framework scaffold of a mammalian monoclonal antibody without induced mutations or modifications in the original VH/VL interface framework residues, said VH/VL interface comprising a Lys residue at position 44, a Leu residue at position 45, a Trp residue at position 47 and a randomized CDR3.

4. (Previously Presented) The polypeptide of claim 3 wherein the selected phage clone is produced in E. coli as insoluble inclusion bodies and the polypeptide isolated therefrom is subsequently refolded in-vitro and purified.

Claims 5-8. (Cancelled)

9. (Previously Presented) The polypeptide of claim 3 wherein the specific antigen of interest is tumor necrosis factor.

10. (Previously Presented) The polypeptide of claim 9 wherein the CDR3 sequence between residues 95 and 100C comprises the sequence: Phe-Pro-Thr-Gly-Asp-Leu-Ala-Glu-Lys (SEQ ID NO: 7).

Claims 11-18. (Cancelled)

19. (Previously Presented) A pharmaceutical composition comprising as an active ingredient the polypeptide of claim 3, and a physiologically acceptable diluent or carrier.

Claims 20-33. (Cancelled)

34. (Previously Presented) The pharmaceutical composition of claim 19 wherein the polypeptide is predominantly monomeric.

Claim 35. (Cancelled)

36. (Previously Presented) The pharmaceutical composition of claim 34 wherein the selected phage clone is produced in E. coli as insoluble inclusion bodies and the polypeptide isolated therefrom is subsequently refolded in-vitro and purified.

Claims 37-39. (Cancelled)

40. (Previously Presented) The pharmaceutical composition of claim 19 wherein the CDR3 sequence between residues 95 and 100C comprises the sequence: Phe-Pro-Thr-Gly-Asp-Leu-Ala-Glu-Lys (SEQ ID NO: 7).

Claims 41-46. (Cancelled)

47. (Previously Presented) A pharmaceutical composition comprising as an active ingredient the polypeptide of claim 1, and a physiologically acceptable diluent or carrier.